



Company Name: _____ Job Site Location: _____

Date: _____ Start Time: _____ Finish Time: _____ Foreman/Supervisor: _____

Topic 157: Mobile Fall Protection System

Introduction: Mobile fall protection systems allow workers the freedom to walk on flat roofs while being fully protected from leading edge falls.

- **Read and understand** the installation and maintenance requirements that are in the manufacturer's instructions. Systems are designed to be used on flat roofs. All workers need to be trained in the proper use of the mobile fall protection system. Inspect the lifelines, harnesses, and d-rings.
- **Always** inspect the system for cracks, defects, splits, bends, and damage before using. Repair or replace immediately. Check for rust and corrosion. Replace immediately. Do not throw or drop any part of the system when loading, unloading, or moving the system.

Set up operations: Make sure the position of the utility cart is parallel to the leading edge with the pivot arms pointing toward the edge.

- **Place** the base assembly onto the utility roof cart and then tighten it down to the utility cart.
- **Slide** the extension arms into the base assembly; tighten down to secure the arms into place.
- **Make sure** the ballast basket slides into the extension arms and is secured with tighteners to hold the basket in place.
- **Insert** the pivot arms onto the opposite side of the base assembly and insert joining bolts.
- **Place** the weight into the ballast basket.



PR600 system: The distance of the pivot arms to the leading edge must be no less than 15 feet. The ballast basket must be extended out to a distance of nine feet from the pivot arms. The amount of the weight to be placed into the ballast basket is 500 pounds.

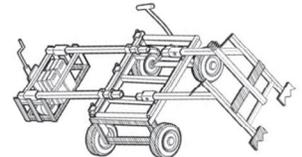
- **Always** turn the handle on the wheel jack to lift the ballast weight. This lowers the pivot arms to touch onto the roof's deck, setting the fall protection system into place.
- **After positioning**, the turning wheel must be locked in the forward position with the locking device or the brake.
- **Make sure** the life lines are hooked up to the d-ring anchors located at the top of the mast. The lifeline must be rigged so that a worker's fall over the edge will be arrested not more than two feet.
- **An accessory plate** must be bolted to the pivot arms and mechanically fastened to the roof's deck, when there is no existing roofing membrane. Only one worker may enter a corner area.
- **Remember**, workers must not round a corner or work at a right angle to the pivot arms at an opposing leading edge.
- **If a worker** does fall at a right angle to the pivot arms, the system will turn about on its axis until the pivot arms are facing the direction of the worker's fall. The pivot points will penetrate the roof and the ballast weight will arrest the worker's fall.
- **Remember**, rigging must be done by a competent person to the distance of the manufacturer's chart. The lifeline must not exceed two feet in addition to the distance from the pivot arms perpendicular to the leading edge. In some states a worker's lifeline must be rigged as a travel restraint.
- **Make sure** the maximum weight of a worker and his tools does not exceed 310 pounds for a PR600.
- **Ensure** that workers are attached directly to the anchor rings on the mast. Never use a static line between two systems.
- **Only** two workers can be rigged under the fall arrest on a PR600. A third worker can be rigged as travel restraint.
- **Remember**, this system must only be used on roof's that are capable of resisting the maximum vertical (800 pounds) and horizontal (3100 pounds) loads resulting from a workers fall and the driving in of the pivot plates into the roof system. Do not use this system in icy conditions. Check the roof before work begins.

Pivot Arms from Edge	Life Line	Reach Along Leading Edge
20ft.	22ft.	25ft.
25ft.	27ft.	30ft.
30ft.	32ft.	32ft.
35ft.	37ft.	35ft.
40ft.	42ft.	40ft.

Travel Restraint		
Pivot Arms from Edge	Life Line	Reach Along Leading Edge
20ft.	19ft. 6"	21ft.
25ft.	24ft. 6"	24ft.
30ft.	29ft. 6"	28ft.

Decking: This system must not be used for fall arrest on leading edge work where the parapet is higher than 30 inches.

- **Make sure** workers are properly trained for rescue and self-rescue operations. If a worker falls over the edge, the life line will pull on the top of the mast, pulling on the cross member that is welded to the pivot arms, pushing on the lower cross member, driving the pivot arm plates into the roofing membrane. Workers should know the proper procedure for getting back up over the edge.
- **When** there is no existing roofing membrane, an accessory plate must be bolted to the pivot arm plates. These are mechanically fastened to the roof deck with wedge anchors embedded into concrete. Check manufacturer's specifications for size and embedment distance (e.g. (4) 3/8 x 2" wedge anchors) (1-1/2" embedment).
- **On wood decks** where there is no existing membrane, turn the handle of the wheel on the wheel jack to lift the ballast weight until the pivot points depress the wood. **On steel fluted decks** where the flutes are running parallel to the leading edge, lift the ballast weight until the pivot points set into the bottom of the flute. **On steel decks** where the flutes run perpendicular to the leading edge, an accessory plate must be bolted to the pivot arm plates. The accessory plate must be fastened to the steel deck with a self tapping sheet metal screw (e.g. minimum 5/16 x 1-1/2").



Conclusion: Remember to reset the ballast after moving the mobile fall protection system. Use these safety guidelines to ensure safe roofing operations.

Work Site Review

Work-Site Hazards and Safety Suggestions: _____

Personnel Safety Violations: _____

Employee Signatures:

(My signature attests and verifies my understanding of and agreement to comply with, all company safety policies and regulations, and that I have not suffered, experienced, or sustained any recent job-related injury or illness.)

Foreman/Supervisor's Signature: _____

These guidelines do not supersede local, state, or federal regulations and must not be construed as a substitute for, or legal interpretation of, any OSHA regulations.